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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/761,222	01/16/2001	Seiichiro Abe	1990.65128	4752

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GREER, BURNS & CRAIN
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EXAMINER

ALAM, SHAHID AL

ART UNIT	PAPER NUMBER
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2172

DATE MAILED: 08/26/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/761,222

Applicant(s)

ABE, SEIICHIRO

Examiner

Shahid Al Alam

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 16 July 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 is/are pending in the application.
- 4a) Of the above claim(s) 10-18 is/are withdrawn from consideration.
- 5) ☒ Claim(s) 19 is/are allowed.
- 6) ☒ Claim(s) 1-3 and 5-9 is/are rejected.
- 7) ☒ Claim(s) 4 is/are objected to.
- 8) ☒ Claim(s) 1-19 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

1. This action is in response to RCE filed on 16 July 2004.

Election/Restrictions

2. Restriction to one of the following inventions is required under 35 U.S.C. 121:
 - I. Claims 1 – 9 and 19, drawn to a document information search apparatus for searching documents in response to a request received over a network, classified in class 707, subclass 10.
 - II. Claims 10 – 15, drawn to a document information search apparatus comprising an index inducing the words that appear in the documents, classified in class 707, subclass 3.
 - III. Claims 16 – 18, drawn to a computer-readable recording medium for storing a computer program for searching documents including extracting nouns from the documents by a morpheme analysis, classified in class 704, subclass 9.

The inventions are distinct, each from the other because of the following reasons:

Inventions in Group I, II and III are related as subcombinations disclosed as usable together in a single combination. The subcombinations are distinct from each other if they are shown to be separately usable. In the instant case, invention in Group III has separate utility such as linguistic analysis of document for retrieval. See MPEP § 806.05(d). Invention in Group I has separate utility and can be applied to any document

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retrieval over a network. Group II has separate utility because it retrieves full text documents.

Inventions in Group I, II and III are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions are information retrieval by (I) utilizing a file over a network (II) searching a full-text indexing, and (III) conducting linguistic analysis.

Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, restriction for examination purposes as indicated is proper.

Because these inventions are distinct for the reasons given above and the search required for Group III is not required for Groups I and II, search required for Group II is not required for Groups I and III, and search required for Group I is not required for Groups II and III, restriction for examination purposes as indicated is proper.

Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

During a telephone conversation with Joseph Fox on 23 August 2004 a provisional election was made with traverse to prosecute the invention of Group I, claims 1 – 9 and 19. Affirmation of this election must be made by applicant in replying to this Office action. Claims 10 – 18 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1 – 2, 5 and 9 are rejected under 35 U.S.C. 102(b) as being anticipated by the publication, "WebMate: A Personal Agent for browsing and Searching," Chen et al., Proceedings of the 2nd International Conference on Autonomous Agents, May, 1998, NY, USA, ACM Press, pages 132-139, hereinafter "WebMate."

With respect to claim 1, WebMate teaches a document information search apparatus for searching document information on the basis of a search request transmitted through a network (Page 134, Fig. 1; search requests are made in the WWW) and responding, wherein: a search condition designating unit which designates a file as a search condition (page 134, col. 2, lines 4; page 137, col. 2, lines 13-18 ("the context of the search keywords in the relevant web pages is used")); a user designates a URL; and transmits contents of said designated file via the network is provided for a search requesting source (page 134; Fig. 1; WebMate receives the web page

designated by a user); and a document search unit which forms a keyword from the file contents transmitted from said search condition designating unit (page 134, col. 2, the 2nd paragraph; WebMate constructs a query based on a current profile which is formed of the keywords that come from a plurality of domains including the Web page visited by users when the users designate them; the creation of a personal profile is described in page 133, col. 12, section 3.1) and searches similar documents from a database (page 134, col. 2; WebMate calculates similarity between the profile and a plurality of Web pages, and recommends the ones based on a threshold; note that WebMate searches a plurality of URL's of users do not designate any particular Web page or URL) is provided on a search side.

As to claim 2, WebMate teaches an apparatus according to claim 1, wherein said search condition designating unit transmits a head file portion of the designated file contents (page 137, lines 13-18; since the designated file is a Web page, the URL associated with the designated Web page is considered the head file)

Claim 4 recites the following:

an apparatus according to claim 1, wherein index information describing a list of important words extracted from search target documents is stored for every document in said database, and said document search unit on the search side comprises: a text extraction processing unit which extracts a text document from the file contents received in response to the search request; a morpheme analyzing unit which extracts nouns by a morpheme analysis of said text document; a keyword forming unit which extracts important words from said nouns and forms a keyword in which said important words

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are coupled by OR; and a search executing unit which searches similar documents by searching the search database by said keyword and notifies the search requesting source of a search result.

As to claim 5 (an apparatus according to claim 4, wherein said keyword forming unit counts the number of times of appearance showing in which documents in the index of each of the search documents stored in said document database each of said nouns appears, selects a predetermined number of upper words each having the number of times of appearance in a predetermined range, and forms the keyword), WebMate teaches the use of TFIDF method and in addition, teaches the use of "top 5 words" in documents for retrieval of the most relevant documents (page 138, col. 1, line 15-17).

As to claim 9 (an apparatus according to claim 1, wherein said search condition designating unit of said search requesting source is provided by a WWW browser of a client, transmits the contents of the file designated by a search request picture plane of said WWW browser to a search machine of a WWW server through the network, and sends said file contents to said document search unit), WebMate shows the WWW environment in page 134, Figure 1. In accordance with the description provided on page 7, lines 18-22 of the Applicant's Disclosure, it appears that the "search request picture plane" is nothing more than a query box where a keyword can be typed in by a user. Since WebMate teaches a browser, it inherently teaches the query box and/or search request picture plane as claimed.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over WebMate.

Claim 6 (an apparatus according to claim 5, wherein in the case where the number of documents in the index is assumed to be (N), said keyword forming unit selects upper ten words each having the number (H) of times of appearance in a range where $2N/3 \leq H \leq 1$ and forms the keyword) requires that top 10 keywords be used to rank and present most relevant documents. WebMate suggests that top 5 keywords be used (page 138, column 1, line 15 – 17).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to select top 10 instead of top 5 because such a change can be adopted without reconfiguring the WebMate system or without incurring any reconfiguration overhead, while a person of ordinary skill in the art would find this as an added flexibility of the system.

2. Claims 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over WebMate as applied to claims 1, 4 and 5 above, and further in view of the publication, "CiteSeer: An Autonomous Web Agent for Automatic Retrieval and identification of Interesting Publications," by Bollacker et al., proceedings of the International

Conference on Autonomous Agents, May 1998, ACM Press, pages 116-123, hereinafter "Citeseer."

As to claim 7 (an apparatus according to claim 5, wherein said keyword forming unit allows property information extracted from the file received in response to the search request to be included in said keyword, thereby allowing the similar documents to be searched), WebMate discloses the extraction of keywords (WebMate teaches that a user can provide any URLs that he would like to be the information sources and that the chosen URL may be used to expand the search in page 134, col. 2, lines 4-6), but does not explicitly indicate that the keywords include property information as claimed.

As to claim 8 (an apparatus according to claim 7, wherein said property information includes a writer of the file received in response to the search request, and a document title.), WebMate discloses the extraction of keywords, but does not explicitly indicate that the keywords extracted include the writer of the file or the title of the file.

As to claims 7 and 8, Citeseer uses a sub-agent to search a plurality of Web pages when a broad keyword is entered by a user in the search query (page 118, col. 1, section 3.13, lines 5-6). Citeseer further teaches the extraction of title and author in response to submitted query (page 118, col. 2, the bottom paragraph).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to combine WebMate and Citeseer to make the system user friendlier as such the user will be able to see the bibliographic information of to-be-retrieved documents. It would have been obvious to a person of ordinary skill in the art at the time the invention was made to combine WebMate and Citeseer to eliminate

some of the retrieval candidates (i.e., to-be-retrieved documents) to avoid the downloading and transmission overhead. It is general knowledge available to one of ordinary skill in the data processing art that a document is more likely to have bibliographic information and that a retrieval system incurs overhead to download a document.

3. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over WebMate as applied to claim 1 above, and further in view of U. S. Patent No. 6,182,085 issued to Eichstaedt ("the '085 patent").

As to claim 3 (an apparatus according to claim 1, wherein said search condition designating unit allows an HTML file and an Excel file to be included in the file which is designated as said search condition), WebMate teaches the parsing of an HTML page (page 134, col. 1, section 3.2. lines 6), however does not explicitly indicate the processing of an EXCEL file.

As to the limitation, "...said search condition designating unit allows an HTML file and an Excel file to be included in the file which is designated as said search condition", WebMate does not explicitly indicate that it is capable of parsing a EXCEL file submitted a query. With respect to claim 3, the '085 patent (Eichstaedt et al.), in column 5, lines 12-32, teaches:

One example of a Gatherer 302 communicatively linked to a web 304 is pictured in FIG. 3 and has a number of components. The web 304 may comprise an Internet, an intranet, or a single information source including media or multimedia objects. The Gatherer 302 may include a Crawler 306 component that crawls media sources and retrieves objects while a Recognizer 308 component tries to determine the format for

each of the retrieved objects. A Summarizer 310 component **contains specialized codes that enable it to read a great number of different object formats such as a Freelance graphics presentation, an HTML page, a Lotus Notes database, or an Excel spreadsheet**. It also provides a flexible structure for plugging - _n customized summarization codes to be used for summarizing data from a specific :Location. Compressed files included in a ZIP, TAR or JAR file are first extracted out by an Expander 312 component and then processed by the Summarizer 310. A Gatherer may also carry an embedded HTTP server (not shown) so that system administrators can use a web-browser to control its operations and monitor its status.

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to combine WebMate and the '085 patent to make the system more user-friendly as such the user would be to submit queries in any form and would not have to convert the query object into a specific format to search for relevant information.

Allowable Subject Matter

4. Claim 4 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

5. The following is an examiner's statement of reasons for allowance:

Claim 19 is allowed over the prior art of record.

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Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Contact Information

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shahid Al Alam whose telephone number is (703) 305-2358. The examiner can normally be reached on Monday-Thursday 8:00 A.M. - 4:00 P.M..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John E Breene can be reached on (703) 305-9790. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


Shahid Al Alam
Primary Examiner
Art Unit 2172

22 August 2004